Claims

1. Method for producing an insulated stator winding for rotating electrical machines, in particular, direct current machines and alternating current machines, where said insulated stator winding is constructed of at least one electrically conductive conductor bar with a rectangular cross-section, whereby at least one electrically insulating shrink-on sleeve with a rectangular cross-section is applied to the periphery of the conductor bar and shrunk onto the conductor bar.

2. Method as claimed in Claim 1, characterized in that the shrink-on sleeve is mechanically dilated in its cold state and applied around the outer periphery of a support sleeve before the support sleeve surrounded by the shrink-on sleeve is pulled over the conductor bar.

3. Method as claimed in Claim 2, characterized in that after the support sleeve surrounded by the shrink-on sleeve is applied to the conductor bar, the support sleeve between the shrink-on sleeve and the conductor bar is removed, in particular, by a helical opening of the support sleeve.

4. Method as claimed in Claim 2, characterized in that the support sleeve is a meltable, in particular conductive polymer, whereby after application of the support sleeve surrounded by the shrink-on sleeve onto the conductor bar the melting of the support sleeve is initiated by introducing heat.

5. Method as claimed in Claim 1, characterized in that a shrink-on sleeve of a hot-shrinking material is used and is shrunk under the effect of heat onto the conductor bar.

6. Method as claimed in Claim 1, characterized in that the shrink-on sleeve is pulled in the cold state over the conductor bar, whereby the sleeve is dilated with compressed air.

7. Method as claimed in one of the previous Claims, characterized in that the shrink-on sleeve is constructed of several radially superimposed layers with different properties.

8. Method as claimed in Claim 7, characterized in that the shrink-on sleeve is produced by co-extrusion, blow molding, or injection molding.

9. Method as claimed in one of the previous Claims, characterized in that a plurality of shrink-on sleeves and/or sleeves with different properties are applied around the periphery of the conductor bar.

10. Method as claimed in one of the previous Claims, characterized in that the shrink-on sleeve is provided at its contact surfaces with the conductor bar with a thermally stable adhesive.

11. Method as claimed in one of the previous Claims, characterized in that the shrink-on sleeve is constructed of an extruded elastomer.

12. Method as claimed in one of the previous Claims, characterized in that the conductor bar surrounded by the shrink-on sleeve is bent with a bending device into the shape suitable for the stator.

13. Method as claimed in one of the previous Claims, whereby conductor bars consisting of individual conductors are used, whereby the individual conductors preferably have a rectangular cross-section.

14. Method as claimed in Claim 13, whereby the individual conductors are temporarily connected with each other.

15. Method as claimed in one of Claims 13 or 14, whereby the conductor bars are not Roebel-transposed in the area of the involute.

16. Shrink-on sleeve for encasing conductor bars 2, whereby the shrink-on sleeve (64) has a rectangular internal cross-section.

17. Shrink-on sleeve as claimed in Claim 16, whereby the shrink-on sleeve (64) is placed around a support sleeve (62).